

**EXHIBIT G**

**IN THE UNITED STATES DISTRICT COURT FOR THE  
EASTERN DISTRICT OF MISSOURI**

MISSOURI NAACP, et al.

Plaintiffs,

v.

Civ. No. 14-2077

FERGUSON-FLORISSANT SCHOOL  
DISTRICT and ST. LOUIS COUNTY  
BOARD OF ELECTION  
COMMISSIONERS,

Defendants.

**SUPPLEMENTAL DECLARATION OF WILLIAM S. COOPER**

WILLIAM S. COOPER, acting in accordance with 28 U.S.C. § 1746, Federal Rules of Civil Procedure 26(a)(2)(B) and 26(e), and Federal Rules of Evidence 702 and 703, does hereby declare and say:

1. My name is William S. Cooper. I serve as a demographic and redistricting expert for the Plaintiffs. I submitted a declaration in this case on May 27, 2015. I submit this supplemental declaration in response to the May 27, 2015 report of Dr. Jonathan Rodden (“Rodden Declaration”).

2. In this supplemental declaration, I address three assertions made by Dr. Rodden in his declaration: (1) African Americans constitute a majority of the voting age population in the Ferguson-Florissant School District (“School District”); (2) the Plaintiffs in this lawsuit cannot meet the *Gingles 1* precondition

that the minority population is sufficiently large and geographically compact to constitute a majority in one or more single-member districts; and (3) African-American homeownership rates in the Ferguson-Florissant School District provide evidence of integration with non-Hispanic Whites. Finally, I address two new claims raised by the attorneys for the Defendants: (1) the Plaintiffs' illustrative plans violate one-person, one-vote requirements because the apportionment base is the 2010 Census total population rather than 2010 citizen voting age population (CVAP) or voting age population (VAP), and (2) the Plaintiffs' illustrative plans are an unconstitutional racial gerrymander.

### **Voting Age Population by Race in Ferguson-Florissant School District**

3. Dr. Rodden does not dispute that, according to the Census Bureau's latest decennial enumeration of the population, Blacks are a minority of the voting age population in Ferguson-Florissant School District and are outnumbered by whites. As noted in my May 27 declaration, according to the 2010 complete count Census, non-Hispanic single-race Blacks represent 47.17% of the voting age population in Ferguson-Florissant School District. Under the more expansive single-race Black VAP category (including Hispanic Blacks), Blacks are 47.33% of the VAP. Even under the all-inclusive "Any Part" Black category, Blacks are just 48.19% of the VAP.<sup>1</sup>

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<sup>1</sup> See Cooper May 27, 2015 Declaration at ¶¶ 27-31; Figure 4.

4. Apart from the decennial enumeration, the Census Bureau also publishes estimates of population numbers. For example, the Census Bureau publishes annual estimates of the population by race for the nation, states, and counties. In addition, population estimates with no breakout by race are available at the municipal level. But the Census Bureau does not publish annual estimates for the total population or population by age and race for school districts.<sup>2</sup>

5. The Census Bureau also publishes population estimates based on the American Community Survey (ACS) on a rolling basis, which Dr. Rodden references in his report. The 3-Year 2011-2013 ACS published by the Census Bureau includes data tables – B01001 “Population by Age” and associated tables C01001A to C01001I – with estimates for population by age, race and ethnicity for the Ferguson-Florissant School District.<sup>3</sup> As a caveat, at the bottom of all population tables, the Census Bureau cautions against using the ACS for population estimates.<sup>4</sup>

Although the American Community Survey (ACS) produces population, demographic and housing unit estimates, it is the Census Bureau's Population Estimates Program that produces and disseminates the official estimates of the population for the nation, states, counties, cities and towns and estimates of housing units for states and counties.

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<sup>2</sup> See <http://www.census.gov/popest/> and <http://www.census.gov/popest/data/index.html>.

<sup>3</sup> See pp. 6-7 in **Exhibit D** attached to *Cooper May 27, 2015 Declaration* for a breakout of the Black VAP and non-Hispanic White VAP in the School District.

<sup>4</sup> See highlighted text, for example, in ACS table C01001B at [http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13\\_3YR/C01001B/9700000US2912010](http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13_3YR/C01001B/9700000US2912010).

6. It should be no surprise that the Census Bureau cautions against using the ACS for population estimates because, unlike the 2010 Census complete count, the ACS is a rolling sample survey based on responses from just one in about 40 persons on an annual basis.

7. Bearing in mind the Census Bureau caveat, according to the 2011-2013 ACS (released in October 2014), the Ferguson-Florissant School District has a total VAP of 49,679, of whom 24,313 (48.94%) are single-race Black (including Hispanic Blacks), a single-race White VAP (including Hispanic Whites) of 23,740 (47.24%), and a non-Hispanic White VAP of 23,242 (46.78%).<sup>5</sup>

8. Thus, contrary to the claim made by Dr. Rodden, Blacks are not a majority of the VAP in the Ferguson-Florissant School District, according to the 2011-2013 ACS.<sup>6</sup>

9. Furthermore, African Americans are not a majority of the citizen voting age population (CVAP) in Ferguson-Florissant School District. There is no citizenship data available for African Americans in the 3-Year 2011-2013 ACS.<sup>7</sup> But from the 5-Year 2009-2013 ACS (with a larger sample size and smaller margins of error than the 3-Year ACS), the point estimate for the single-race Black

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<sup>5</sup> The ACS does not publish estimates for persons who are single-race non-Hispanic Black or persons of two or more races who self-identified as some part Black.

<sup>6</sup> See ¶ 12 of the *Rodden Declaration*.

<sup>7</sup> See 3-Year 2011-2013 ACS Table B05003B at the link below:  
[http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13\\_3YR/B05003B/9700000US2912010](http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13_3YR/B05003B/9700000US2912010).

CVAP in Ferguson-Florissant School District is 48.12%. The comparable CVAP statistic for non-Hispanic Whites is 49.14%.<sup>8</sup>

10. Thus, based on citizenship data from the 2009-2013 ACS, Blacks are neither a majority nor a plurality of the CVAP, while non-Hispanic Whites remain a plurality of the CVAP – just as they are a plurality of the VAP according to the 2010 Census.<sup>9</sup>

11. It is important to note that the 3-Year ACS has been discontinued by the Census Bureau.<sup>10</sup> In 2015, the only ACS dataset available for Ferguson-Florissant School District will be the 5-Year 2010-2014 ACS, which is released in December. Like the 2011-2013 ACS, the 2010-2014 ACS will have a survey midpoint of July 2012, so it is unlikely to reveal that the School District is majority-BVAP or majority-BCVAP. ACS data with a survey midpoint of July 2015 will not be available until the 2013-2017 ACS, which will be released in December 2018.

12. Dr. Rodden also references his future projections of the population demographics. Projections based on trend lines from prior years are highly

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<sup>8</sup> See 5-Year 2009-2013 ACS Tables B05003 and associated tables B05003B and B05003H. For example, see Black citizenship estimates at the link below:

[http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13\\_5YR/B05003B/9700000US2912010](http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13_5YR/B05003B/9700000US2912010).

<sup>9</sup> See Cooper May 27, 2015 Declaration, ¶¶ 18-19.

<sup>10</sup> See <http://content.govdelivery.com/accounts/USCENSUS/bulletins/eeb4af?reqfrom=share>.

speculative,<sup>11</sup> particularly given the recent events in the Ferguson area. It is unclear just what impact these events will have on Black in-migration and out-migration.

### **Geographical Compactness of the African-American Population**

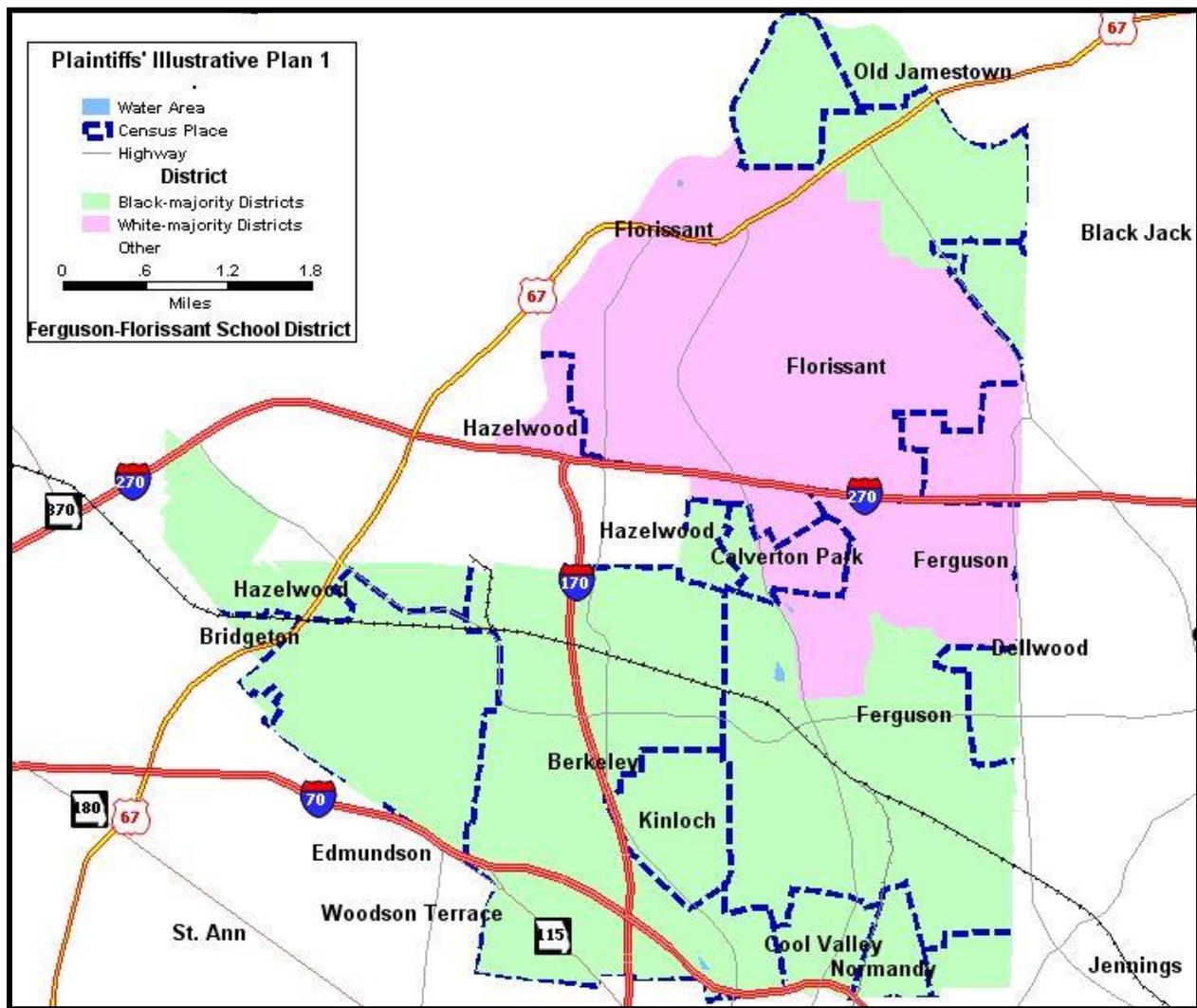
13. African Americans live in two geographically compact areas of the School District – perhaps best visualized by examining Districts 1,2, 3, and 7 of *Plaintiffs' Illustrative Plan 1*. Figure 1 (on the next page) shows *Plaintiffs' Illustrative Plan 1*, with the area encompassed by majority-Black Districts 1, 2, 3, and 7 shaded green.

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<sup>11</sup> See ¶ 13 of the *Rodden Declaration*.

**Figure 1**

**Majority-Black and Majority-White Districts in Plaintiffs' Illustrative Plan 1**



14. The majority-Black area in the School District is visually compact – on both the north end and south end portions. Nearly three-fourths (73.9%) of the Black population in the School District lives in the green area. About two-thirds (67.7%) of the population in the green area is Black.

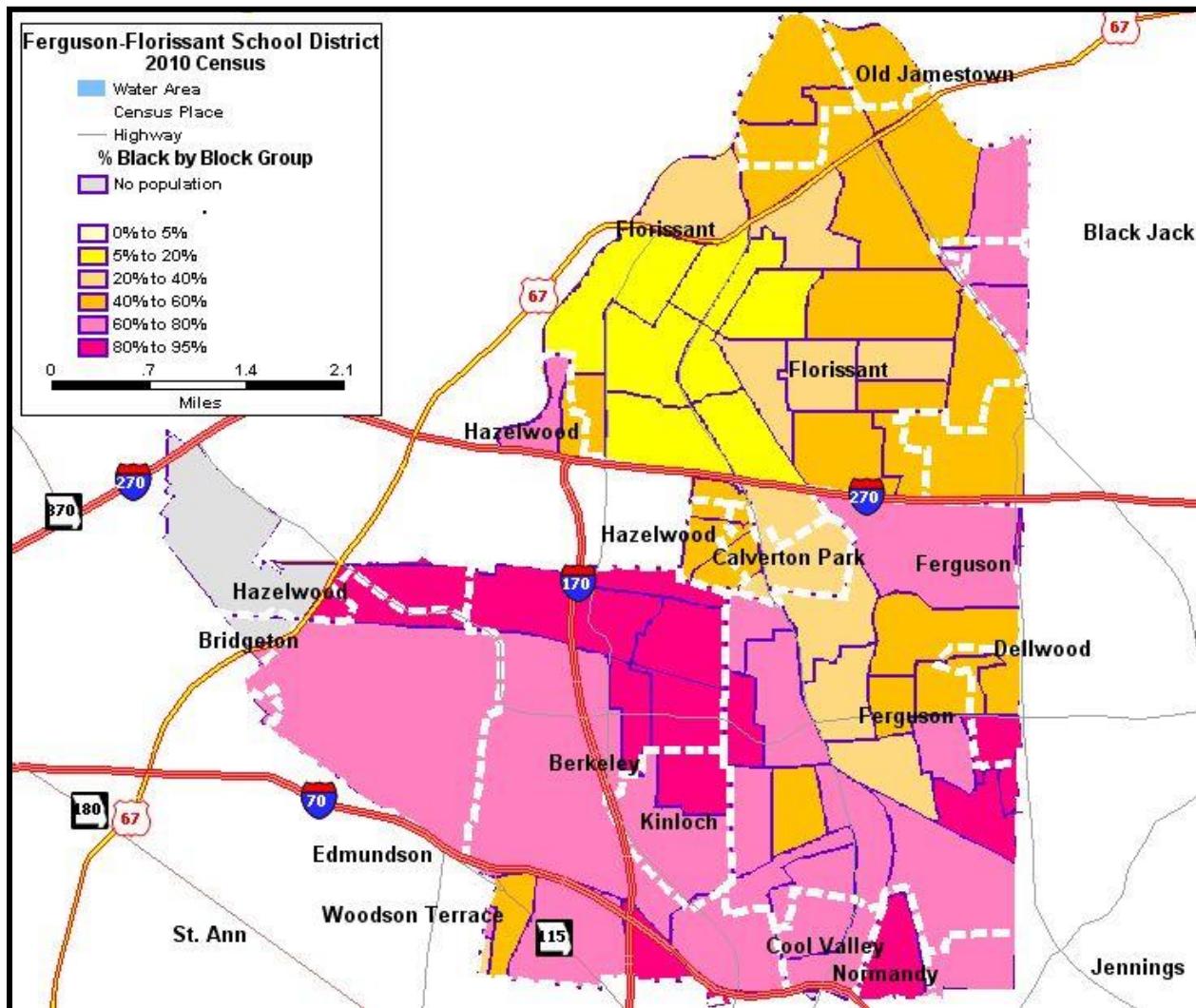
15. The majority-Black districts in the *Plaintiffs' Illustrative Plan 1* mirror the predominantly Black census block groups in the **Figure 2** map (on the next page) reproduced from my May 27 declaration.<sup>12</sup> There are 26 of 71 block groups in the School District with Black population percentages equal to or greater than 60% – shaded pink (60% to 80%) and red (80% to 95%) on the **Figure 2** map. These predominantly Black census block groups have a total 2010 Black population of 19,126, representing 53% of the total Black population in the School District. About two-thirds (68.2%) of the 24,461 persons in these 60%+ block groups are Black.

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<sup>12</sup> See Cooper May 27, 2015 Declaration ¶¶ 33-35; Figure 7.

**Figure 2**

**Ferguson-Florissant SD – Percent Black by Block Group (2010 Census)**



16. Dr. Rodden's conclusion that "African Americans are not the type of 'insular' or 'geographically compact' minority group discussed by United States Supreme Court in *Gingles*"<sup>13</sup> just does not comport with the visual reality. In addition, *Gingles 1* provides only that the minority group must be sufficiently large

<sup>13</sup> Rodden Declaration ¶ 17.

and geographically compact to constitute a majority in a single-member district.

That standard is undeniably met here. The geographic concentration index

Dr. Rodden relies upon<sup>14</sup> to reach his conclusion may have value for some forms of spatial analysis in the social sciences, but it is ill-suited for a *Gingles 1* analysis.

### **African-American Homeownership Rates**

17. Dr. Rodden states that “the majority of African American households in the district are occupied by owners rather than renters.”<sup>15</sup> To the extent that his statement is meant to imply that the African-American homeownership rate in the School District should be a source of optimism, it is somewhat misleading.

According to the 3-Year ACS, over the past decade, the African-American homeownership rate in the School District has dropped from about 61% (2005-2007 ACS) to 50.7% (2011-2013 ACS).<sup>16</sup> (See the table in **Figure 3** on the next page.)

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<sup>14</sup> See Rodden Declaration ¶ 15.

<sup>15</sup> See Rodden Declaration ¶ 15.

<sup>16</sup> See Table B25003B at:  
[http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13\\_3YR/B25003B/9700000US2912010](http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13_3YR/B25003B/9700000US2912010).

**Figure 3****Ferguson-Florissant School District Black Homeownership by 3-Year ACS**

ACS Survey Period	% Owner-occupied (of Black Households)
2005-2007	61.5%
2006-2008	56.1%
2007-2009	51.3%
2008-2010	50.6%
2009-2011	48.9%
2010-2012	49.8%
2011-2013	50.7%

18. According to the 2011-2013 ACS, the non-Hispanic White homeownership rate in the Ferguson-Florissant School District is 84.5% – about 34 percentage points higher than the Black rate. Statewide, the 2011-2013 ACS reports a Black homeownership rate of 40.5%, but the non-Hispanic White homeownership rate is also lower at 72.4%. The Black/White homeownership gap in the School District is therefore actually slightly higher (about 34 percentage points) than the statewide gap (about 32 percentage points).

19. The 2010 complete count Census (Summary File 1) reports a similar disparity in Black/White homeownership rates – 54.77% for Blacks,<sup>17</sup> compared to

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<sup>17</sup> See Table H14 at:  
[http://factfinder.census.gov/bkmk/table/1.0/en/DEC/10\\_SF1/H14/9700000US2912010](http://factfinder.census.gov/bkmk/table/1.0/en/DEC/10_SF1/H14/9700000US2912010)

83.77% for whites,<sup>18</sup> resulting in a Black/White gap in Ferguson-Florissant School District of about 29 percentage points.

20. This gap roughly mirrors the statewide gap found by the 2010 Census, which reports the Black homeownership rate at 42.43% and the White homeownership rate at 72.99% (a gap of about 30 percentage points).

**Do Plaintiffs' Illustrative Plans Violate One-Person, One-Vote Because the Apportionment Base is Total Population Rather than CVAP or VAP?**

21. In my 25+ years' experience reviewing many hundreds of redistricting plans adopted by local and state governments, not once have I seen a plan with a voting age population apportionment base for purposes of equalizing population among districts. Not once have I seen a jurisdiction explicitly state that the voting age population should be balanced across districts. That said, it is possible to create four out of seven majority-Black districts in Ferguson-Florissant School District using voting age as the apportionment base. In fact, it is possible to develop a plan that has four out of seven majority-Black districts, with all seven districts simultaneously within plus or minus 5% deviation based on either total population or voting age population.

22. According to the 2011-2013 ACS, the voting age population in Ferguson-Florissant School District is 49,679, of whom just 732(1.47%) are not

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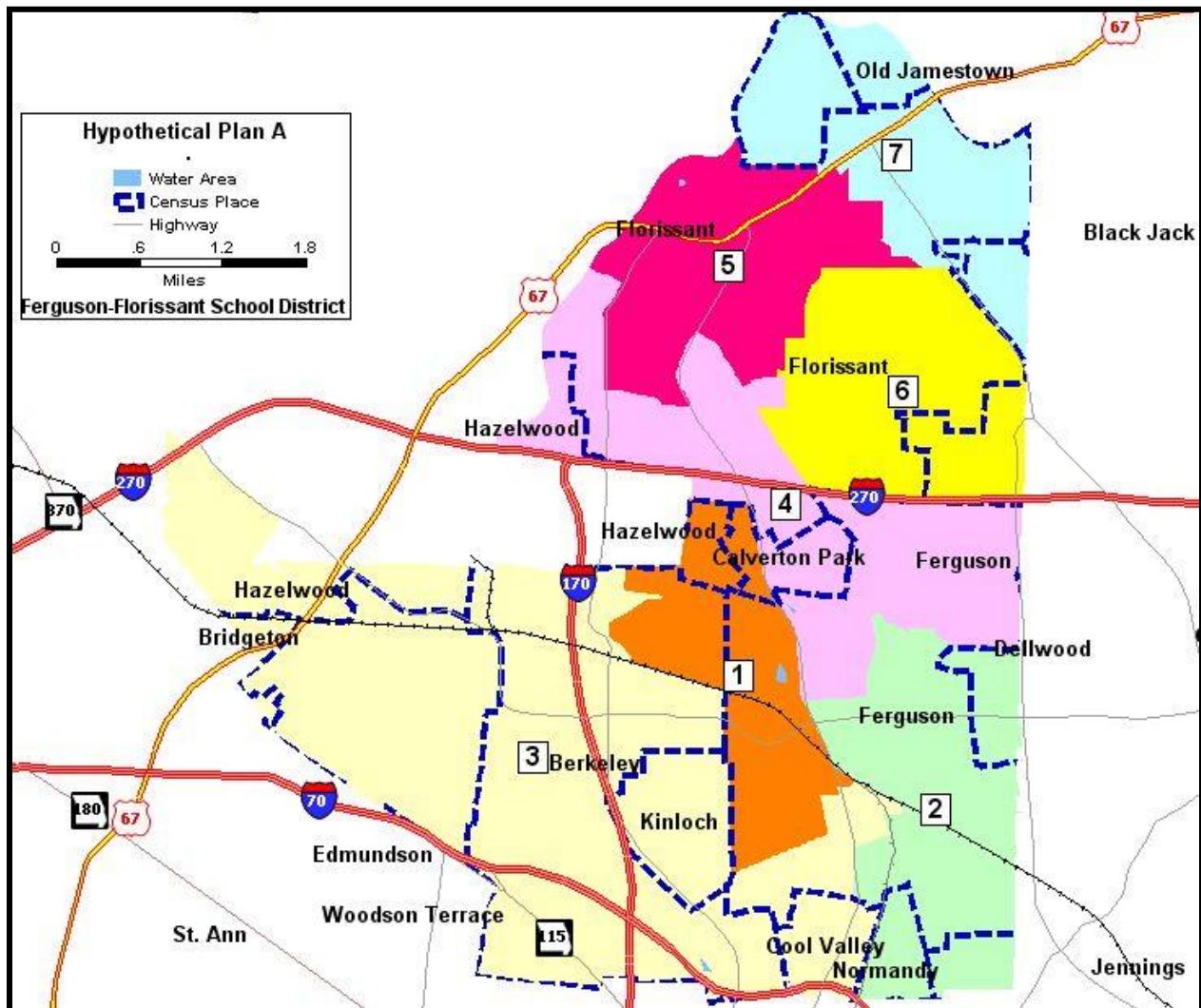
<sup>18</sup> Unlike the ACS homeownership by race dataset, the 2010 Census homeownership data does not include a breakout for non-Hispanic Whites.

citizens.<sup>19</sup> Given the minuscule size of the non-citizen population, it would be pointless to use CVAP for the apportionment base in the School District. (After all, if CVAP is used, it must be disaggregated to the block level based on the 2010 Census VAP.)

23. *Hypothetical Plan A*, shown in **Figure 5** (on the next page), achieves the twin deviation objective of plus or minus 5% based on either total population or voting age population. The plan is very similar to *Plaintiffs' Illustrative Plan 1*, except for minor population shifts between Districts 4 and 5 to balance the voting age population.

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<sup>19</sup> See Table B05003:  
[http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13\\_3YR/B05003/9700000US2912010](http://factfinder.census.gov/bkmk/table/1.0/en/ACS/13_3YR/B05003/9700000US2912010).

**Figure 5****Hypothetical Plan A**

24. Summary population statistics for *Hypothetical Plan A* are in **Figure 6**

(on the next page). The table shows deviations based on total population and voting age population. The ideal district size using total population as the apportionment base is 9,809 (68,663/7). The ideal district size using the voting age population as the apportionment base is 7,253 (50,771/7).

**Figure 6****Hypothetical Plan A**

District	Population	Total Pop. Deviation	% Total Pop. Deviation	Voting Age Pop.	Voting Age Pop. Deviation	% Voting Age Pop. Deviation	% 18+ Black
1	9841	32	0.33%	6918	-335	-4.62%	63.93%
2	10025	216	2.20%	7071	-182	-2.51%	60.95%
3	9923	114	1.16%	6984	-269	-3.71%	74.36%
4	9553	-256	-2.61%	7596	343	4.73%	28.07%
5	9765	-44	-0.45%	7600	347	4.78%	16.96%
6	9980	171	1.74%	7442	189	2.61%	38.94%
7	9576	-233	-2.38%	7160	-93	-1.28%	52.86%

25. Based on a total population apportionment base, the overall deviation for *Hypothetical Plan A* is 4.81%. District 2 is the most overpopulated at 2.20% and District 4 is the most underpopulated at -2.61%.

26. Based on a voting age population apportionment base, the overall deviation for *Hypothetical Plan A* is 9.40%. District 5 is the most overpopulated at 4.78% and District 1 is the most underpopulated at -4.62%.<sup>20</sup>

### **Do the Plaintiffs' Illustrative Plans Constitute a "Racial Gerrymander"?**

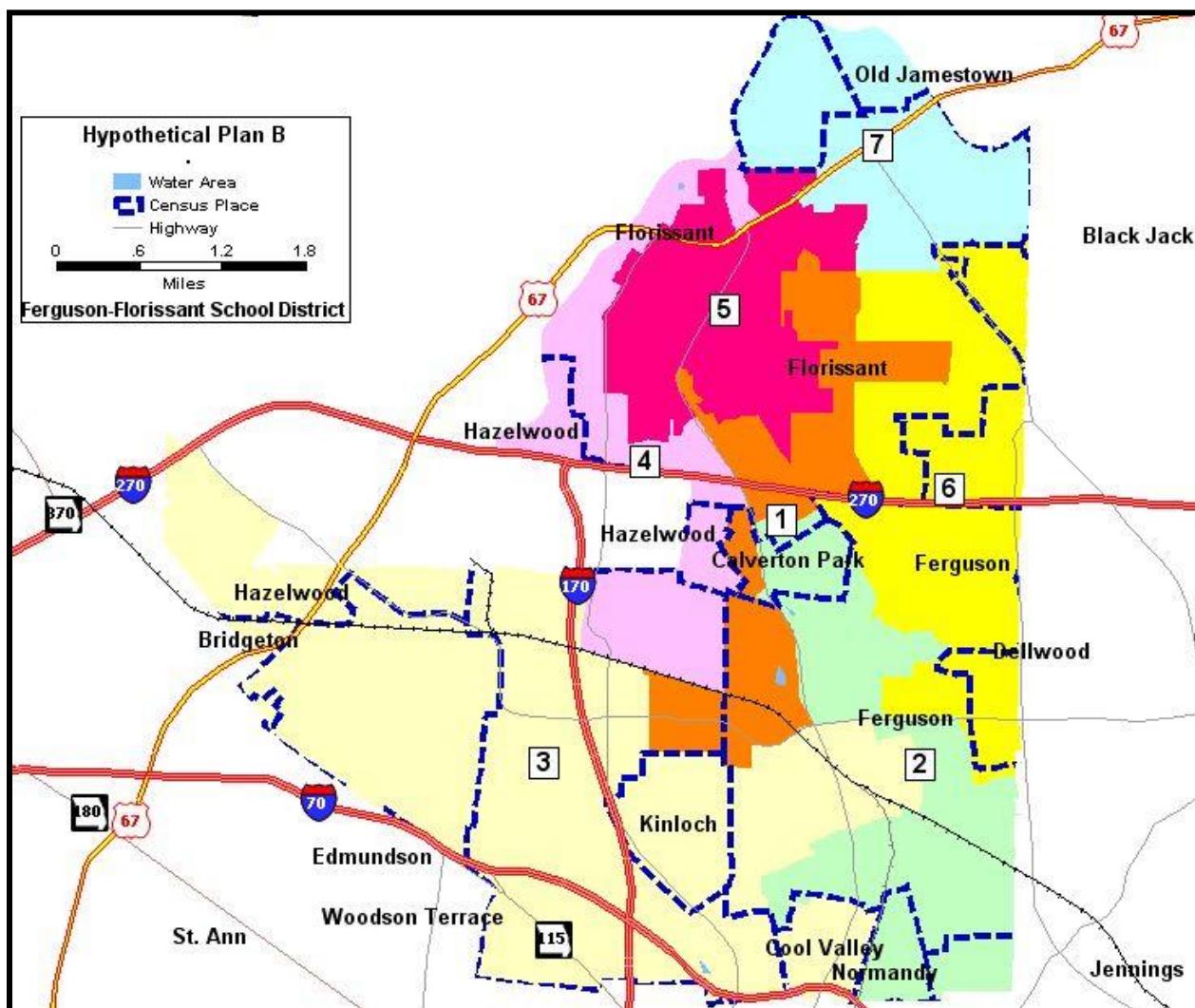
27. The Plaintiffs' illustrative plans are not a "racial gerrymander" because they are not drawn with race as the predominant criterion. The plans are not racial gerrymanders because they also comply with traditional redistricting principles, including one-person, one-vote; compactness; contiguity; avoiding unnecessary

<sup>20</sup> The overall deviation for *Plaintiffs' Illustrative Plan I* using voting age population as the apportionment base is 12.02%. District 5 is the most overpopulated at 7.40% and District 1 is the most underpopulated at -4.62%.

splitting of precinct boundaries; and respect for communities of interest. The illustrative plans create four out of seven majority black districts. Had I made race predominant, I could have created six out of seven majority-black districts as shown in **Figure 7**.

**Figure 7**

**Hypothetical Plan B**



28. **Figure 8** provides summary population statistics for *Hypothetical Plan B*. The Any Part BVAP percentages range from a low of 51.0% in District 6 to a

high of 60.29% in District 3. The Black-White voting age percent margins for the six majority-Black districts range from a low of 4.58% in District 6 to a high of 24.46% in District 3. (The plan meets one-person, one-vote requirements with an overall deviation of 8.81 %.)

### **Figure 8**

#### **Hypothetical Plan B – 2010 Census Summary**

District	Population	% Deviation	18+_Pop	% 18+ Black	% 18+ AP Black	% 18+ NH White	Margin (%) 18+ AP Black- % 18+ NH White)
1	10163	3.61%	7300	51.71%	52.59%	44.93%	7.66%
2	10079	2.75%	7182	59.11%	60.00%	37.66%	22.33%
3	9400	-4.17%	6849	59.41%	60.29%	35.83%	24.46%
4	9529	-2.85%	6982	53.27%	54.33%	42.52%	11.80%
5	10264	4.64%	7958	11.57%	12.20%	85.18%	-72.98%
6	9721	-0.90%	7400	50.22%	51.00%	46.42%	4.58%
7	9507	-3.08%	7100	50.49%	51.42%	45.49%	5.93%

### **Conclusion**

29. From the preceding analysis, I reach the following conclusions:

- African Americans are not a voting age population majority in the Ferguson-Florissant School District. This is true based on the complete count 2010 Census. This is also true based on sample estimates from the 3-Year 2011-2013 American Community Survey.
- African Americans are not a citizen voting age population majority in the Ferguson-Florissant School District. This is true based

on sample estimates from the 5-Year 2009-2013 American Community Survey.

- African Americans in the Ferguson-Florissant School District are sufficiently numerous and geographically compact to comprise a majority of the voting-age population in at least four of seven single-member districts.
- African-American homeownership rates in the Ferguson-Florissant School District have fallen over the past decade – from 61.2% at the peak of the housing bubble (2005-2007 ACS) to 50.7% (2011-2013 ACS).
- The homeownership gap between Blacks and non-Hispanic Whites in the Ferguson-Florissant School District is very wide – about 34 percentage points according to the 2011-2013 ACS, and about 29 percentage points according to the 2010 Census.
- Citizen voting age population is not a factor in the Ferguson-Florissant School District because citizens comprise 98.53% of the voting age population.
- It is possible, but not necessary, to develop a 7-district plan (as depicted in *Hypothetical Plan A*) that simultaneously balances total population and voting age population, such that the overall deviation

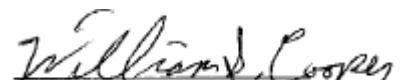
under both deviation metrics is less than 10%, with four majority-Black districts.

- Neither of the Plaintiffs' two illustrative plans is a racial gerrymander. A racial gerrymander would result in a plan with six of seven majority-Black districts (as depicted in *Hypothetical Plan B*), which disregarded traditional redistricting principles.

I reserve the right to continue to supplement my declarations in light of additional facts, testimony, and/or materials that may come to light.

Pursuant to 28 U.S.C. § 1746, I declare under penalty of perjury of the laws of the United States that the foregoing is true and correct according to the best of my knowledge, information, and belief.

Executed on: July 2, 2015



WILLIAM S. COOPER